

In the claims:

Please amend the claims as follows.

1. (Currently amended) A process for the removal of ~~SO<sub>2</sub>, HCN and H<sub>2</sub>S and optionally one or more compounds from the group of COS, CS<sub>2</sub> and NH<sub>3</sub>~~ sulfur from a first gas stream comprising SO<sub>2</sub>, HCN and H<sub>2</sub>S, which said process comprises the steps of:
  - (a) removing SO<sub>2</sub> from the first gas stream by contacting the first gas stream in a hydrogenation zone with a hydrogenation catalyst in the presence of hydrogen to convert SO<sub>2</sub> to H<sub>2</sub>S and to obtain a second gas stream comprising H<sub>2</sub>S;
  - (b) removing HCN ~~and optionally COS and/or CS<sub>2</sub>~~ from the second gas stream obtained in step (a) by contacting the second gas stream in a hydrolysis zone with a hydrolysis catalyst in the presence of water to convert HCN to ammonia and to obtain a third gas stream comprising NH<sub>3</sub>;
  - (c) removing NH<sub>3</sub> from the third gas stream by contacting the third gas stream in a NH<sub>3</sub>-removal zone with an aqueous acidic washing liquid to obtain an ammonium-comprising aqueous stream and a fourth gas stream;
  - (d) removing H<sub>2</sub>S from the fourth gas stream by contacting the fourth gas stream in a H<sub>2</sub>S-removal zone with an aqueous alkaline washing liquid to obtain a H<sub>2</sub>S-depleted gas stream and a hydrogensulphide-comprising aqueous stream;
  - (e) contacting the hydrogensulphide-comprising aqueous stream obtained in step (d) with sulphide-oxidizing bacteria in the presence of oxygen in an oxidation reactor to obtain a sulphur slurry and a regenerated aqueous alkaline washing liquid;
  - (f) separating at least part of the sulphur slurry obtained in step (e) from the regenerated aqueous alkaline washing liquid and;
  - (g) recycling the regenerated aqueous alkaline washing liquid obtained in step (e) as the aqueous alkaline washing liquid to the H<sub>2</sub>S-removal zone in step (d).
2. (Previously Presented) A process according to claim 1, wherein the sulphur- load in the H<sub>2</sub>S-removal zone in step (d) is between 50 and 50000 kg/day.

3. (Currently Amended) A process according to claim ~~2~~1, wherein the total concentration of sulphur~~[[ - ]]~~ compounds in the ~~treated~~ H<sub>2</sub>S-depleted gas stream is below 30 ppmv.
4. (Currently Amended) A process according to claim 3, wherein the total concentration of H<sub>2</sub>S in the H<sub>2</sub>S-depleted gas stream is below 30 ppmv.
5. (Currently Amended) A process according to claim 4, wherein the aqueous alkaline washing liquid in step (d) is buffered to maintain it at a pH of between 6 and 10.
6. (Currently Amended) A process according to claim 5, wherein the ~~contents~~ regenerated aqueous alkaline washing liquid of the oxidation reactor in step (e) is buffered to maintain it at a pH of between 6 and 10.
7. (Currently Amended) A process according to claim ~~6~~2, wherein the oxidation reactor in step (e) has a volume of between 5 and 2500 m<sup>3</sup>.
8. (Currently Amended) A process according to claim ~~7~~6, wherein the sulphur slurry obtained in step (e) is re-slurried, filtered and dried to obtain a sulphur-content of at least 95 wt%.
9. (Currently Amended) A process according to claim 8, wherein water ~~or steam or a mixture thereof~~ is added to the second gas stream prior to contacting ~~it the first gas stream in a hydrolysis zone~~ with a the hydrolysis catalyst in step (b).
10. (Previously Presented) A process according to claim 9, wherein the water/steam content of the second gas stream is between 10 v/v% and 80 v/v%, based on steam%.

Please add the following new claims:

11. (New) A process, comprising:  
contacting a first gas stream that comprises SO<sub>2</sub>, HCN, and H<sub>2</sub>S with a hydrogenation catalyst and in the presence of hydrogen within a hydrogenation zone to thereby convert said SO<sub>2</sub> to H<sub>2</sub>S and to obtain a second gas stream, comprising H<sub>2</sub>S;

contacting said second gas stream with a hydrolysis catalyst and in the presence of water within a hydrolysis zone to obtain a third gas stream, comprising  $\text{NH}_3$ ;

contacting said third gas stream with an aqueous (acidic) washing liquid within an  $\text{NH}_3$  removal zone to yield an ammonium-comprising aqueous stream comprising an ammonium and a fourth gas stream; and

contacting said fourth gas stream with an aqueous alkaline washing liquid within an  $\text{H}_2\text{S}$  removal zone to yield a sulfide-comprising aqueous stream, comprising  $\text{H}_2\text{S}$ , and an  $\text{H}_2\text{S}$ -depleted gas stream having an  $\text{H}_2\text{S}$  concentration of less than 30 ppmv.

12. (New) A process as recited in claim 11, further comprising:

contacting said sulfide-comprising aqueous stream with sulfide-oxidizing bacteria and in the presence of oxygen within an oxidation reactor zone to obtain a sulfur slurry and a regenerated aqueous alkaline washing liquid;

separating at least part of said sulfur slurry from said regenerated aqueous alkaline washing liquid; and

recycling said regenerated aqueous alkaline washing liquid as said aqueous alkaline washing liquid to said  $\text{H}_2\text{S}$  removal zone.

13. (New) A process as recited in claim 11, wherein said first gas stream has a total concentration of sulfur compounds of between 10 ppmv and 30 vol % and a total concentration of HCN of between 10 and 5000 ppmv.

14. (New) A process as recited in claim 13, wherein said second gas stream has a concentration of  $\text{SO}_2$  below 100 ppmv.

15. (New) A process as recited in claim 14, wherein said third gas stream has a concentration  $\text{NH}_3$  of between 10 and 6000 ppmv and a concentration of HCN of below 0.01 vol % (100 ppmv).

16. (New) A process as recited in claim 15, wherein said fourth gas stream has a total amount of  $\text{H}_2\text{S}$  of between 10 ppmv and 20 vol %.

17. A process as recited in claim 16, wherein the hydrogenation zone operating conditions include an hydrogenation zone temperature between 200 °C and 380 °C and an hydrogenation zone pressure between 1 and 100 bara.

18. (New) A process as recited in claim 17, wherein said aqueous alkaline washing liquid has a pH in the range of from 7 to 12 and includes an hydroxide solution selected from solutions of sodium hydroxide and potassium hydroxide.

19. (New) A process as recited in claim 18, wherein said hydrogenation catalyst includes those catalysts selected from cobalt/molybdenum, cobalt/tungsten and nickel/molybdenum catalyst, and wherein said hydrolysis catalyst includes those catalysts selected from TiO<sub>2</sub> based catalysts, catalysts based on alumina, and catalysts based on chromium oxide.